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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/765,924	01/20/2001	Jerry A. Dukes	5603.02	8271

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DORSEY & WHITNEY, LLP  
INTELLECTUAL PROPERTY DEPARTMENT  
370 SEVENTEENTH STREET  
SUITE 4700  
DENVER, CO 80202-5647

EXAMINER

DUNWOODY, AARON M

ART UNIT	PAPER NUMBER
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3679

DATE MAILED: 02/04/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/765,924

Applicant(s)

DUKES ET AL.

Examiner

Aaron M Dunwoody

Art Unit

3679

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 11 December 2002.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-9 and 17-19 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-9 is/are rejected.
- 7) ☒ Claim(s) 17-19 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☒ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 4.
- 4) ☐ Interview Summary (PTO-413) Paper No(s) \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

## DETAILED ACTION

### *Claim Rejections - 35 USC § 103*

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over US patent 5480196, Adams, Jr. in view of US patent 4752208, Iwata et al and US patent 5842727, Shade.

In regards to claim 1, Adams, Jr. discloses a pipe connection joint structure comprising opposing bell-formed (shaped) ends (66, 68); a connector insert (62) defining opposing ends and a push-ring (64); at least one gasket (30) positioned on at least one of the opposing ends of the connector insert; and wherein the opposing ends of the connector insert are positioned in the bell-formed ends, with the at least one gasket forming a seal therebetween.

Adams, Jr. does not disclose corrugated pipe. Iwata et al teaches the use of corrugated pipe (1) for flexibility while maintaining relatively light in weight and allowing water to smoothly flow therethrough (column 1, lines 20-23). It would have been obvious to one having ordinary skill in the art at the time the invention was made to provide corrugated piping for flexibility while maintaining relatively light in weight and allowing water to smoothly flow therethrough, as taught by Iwata et al.

Adams, Jr. does not disclose at least first and second sections defined by a sloped transition from the first inner diameter to a second inner diameter. Shade teaches at least first and second sections defined by a sloped transition (34) from the first inner diameter to a second inner diameter (32) "to slidably receive spiral corrugated pipe" (col. 3, lines 56-57). It would have been obvious to one having ordinary skill in the art at the time the invention was made to fabricate the at least first and second sections with a sloped transition from the first inner diameter to a second inner diameter to slidably receive spiral corrugated pipe, as taught by Shade.

In regards to claim 2, Adams, Jr. discloses the opposing ends of the connector insert being substantially equal in length to the length of the opposing bell-formed ends.

In regards to claim 3, Adams, Jr. discloses the connector insert further comprising at least one flange having a diameter DS proximate to the at least one gasket.

In regards to claim 4, Adams, Jr. in view of Iwata et al and Shade discloses the claimed invention except for the push-ring having a thickness of at least 0.25 inches. It would have been obvious to one having ordinary skill in the art at the time the invention was made to fabricate the push-ring with a thickness of at least 0.25 inches, since the optimization of proportions in a prior art device is a design consideration within the skill of the art. In re Reese, 290 F.2d 839, 129 USPQ 402 (CCPA 1961).

In regards to claim 5, Adams, Jr. discloses at least one gasket positioned on each of the opposing ends of the connector insert.

In regards to claim 6, Adams, Jr. discloses the seal being a watertight seal.

In regards to claim 7, Iwata et al discloses the two sections of corrugated pipe having an outer diameter of  $D_y$  and an inner diameter of  $D_i$  and the opposing bell-formed ends have an outer diameter of  $D_o$  and an inner diameter of  $D_b$ .

In regards to claim 8, Adams, Jr. in view of Iwata et al and Shade discloses the push-ring of the connector insert having an outer diameter substantially equal to  $D_o$ .

In regards to claim 9, Adams, Jr. discloses the at least one gasket having an outer diameter greater than  $D_b$ .

#### ***Allowable Subject Matter***

Claims 17-19 are allowed.

#### ***Response to Arguments***

Applicant's arguments with respect to claims 1-9 have been considered but are moot in view of the new ground(s) of rejection.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Aaron M Dunwoody whose telephone number is (703) 306-3436. The examiner can normally be reached on Monday - Friday between 7:30 am to 4:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Lynne H Browne can be reached on (703) 308-1159. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9302 for regular communications and (703) 872-9327 for After Final communications.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-1113.

.amd  
January 30, 2003



**Lynne H. Browne**  
**Supervisory Patent Examiner**  
**Technology Center 3670**